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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/037,467

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Braulio A. Polanco

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EXAMINER

PIERCE, JEREMY R

ART UNIT

PAPER NUMBER

1771

DATE MAILED: 05/11/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 10/037,467	Applicant(s) POLANCO ET AL.	
	Examiner Jeremy R. Pierce	Art Unit 1771	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 23 February 2004.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 15-27,31-33,35-40 and 42-59 is/are pending in the application.
- 4a) Of the above claim(s) 15-26 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 27,31-33,35-40 and 42-59 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Response to Amendment

1. Applicant's amendment filed on February 23, 2004 has been entered. Claims 27, 31, 35, and 49-59 have been amended. Claim 41 has been cancelled. The amendment is sufficient to cure the 35 USC 112 rejections set forth in sections 4 and 6 of the last Office Action.

Claim Rejections - 35 USC § 102/103

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 27, 31-33, 35, 36, 41-44, and 46-59 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over White et al. (WO 00/66057).

White et al. disclose a nonwoven web with a plurality of substantially continuous fibers having a z-direction orientation (page 3, lines 26-29). The base material for the

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nonwoven fabric may be a bicomponent spunbond (page 9, lines 17-21). The bicomponent fibers may have a side-by-side configuration and be crimped (page 11, line 16-17). White et al. do not teach the same processing steps for making the nonwoven fabric. However, "even though product-by-process claims are limited by and defined by the process, determination of patentability is based on the product itself. The patentability of a product does not depend on its method of production. If the product in the product-by-process claim is the same as or obvious from a product of the prior art, the claim is unpatentable even though the prior product was made by a different process." *In re Thorpe*, 227 USPQ 964, 966 (Fed. Cir. 1985). Once the Examiner provides a rationale tending to show that the claimed product appears to be the same or similar to that of the prior art, although produced by a different process, the burden shifts to applicant to come forward with evidence establishing an unobvious difference between the claimed product and the prior art product. *In re Marosi*, 218 USPQ 289, 292 (Fed. Cir. 1983). The use of 35 USC 102/103 rejections for product-by-process claim has been approved by the courts. "The lack of physical description in a product-by-process claim makes determination of the patentability of the claim more difficult, since in spite of the fact that the claim may recite only process limitations, it is the patentability of the product claimed and not of the recited process steps which must be established. We are therefore of the opinion that when the prior art discloses a product which reasonably appears to be either identical with or only slightly different than a product claimed in a product-by-process claim, a rejection based alternatively on either section 102 or section 103 of the statute is eminently fair and acceptable. As a practical

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matter, the Patent Office is not equipped to manufacture products by the myriad of processes put before it and then obtain prior art products and make physical comparisons therewith." *In re Brown*, 173 USPQ 685, 688 (CCPA 1972). With regard to claims 32 and 33, White et al. disclose that superabsorbent particles may be present in the web (page 12, line 4). With regard to claim 36, White et al. disclose the web may weigh between 0.25 and 50 osy (page 10, line 11). With regard to claims 41, 42, 47, and 48 the fibers are randomly crimped (column 11, lines 16-17) and exhibit shingled layers of buckled z-direction orientation (Figures 4-9). With regard to claim 43, the fibers may comprise polypropylene and polyethylene (page 11, lines 23-24). With regard to claim 44, White et al. disclose the fibers may comprise PET, nylon, PBT, and various polyolefin copolymers (page 8, line 24 –page 9, line 3). With regard to claim 46, the nonwoven web may be bonded by adhesive or thermal bonding (page 9, lines 4-6). With regard to claims 49-59, these claims are directed to additional processing steps. As set forth above, the patentability of a product does not depend on its method of production. Applicant has the burden to come forward with evidence establishing an unobvious difference between the claimed product and the prior art product.

Claim Rejections - 35 USC § 103

5. Claims 37-40 are rejected under 35 U.S.C. 103(a) as being unpatentable over White et al.

White et al. do not disclose the claimed density and loft values for the nonwoven web. However, both the present invention and the invention of White et al. are used for

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thermal and sound insulation (page 1, line 10), and making the web of White et al. within the claimed density range of between 0.002 and 0.05 g/cc and the claimed loft range of 0.02 and 1.50 inches would be an obvious modification to a person skilled in the art. White et al. disclose that characteristics of the web may be varied by adjusting elements such as nip geometry, distance between moving surfaces, vacuum strength and location, bonding mechanism, and speed of material entering and leaving the nip (page 9, lines 22-27). Adjusting these variables would affect the loft and the density of the web. It would have been obvious to a person having ordinary skill in the art at the time of the invention to adjust the above stated variables in order to create a web material with an optimized density and loft for its intended use as insulation, since it has been held that discovering an optimum value of a result effective variable involves only routine skill in the art. *In re Boesch*, 617 F.2d 272, 205 USPQ 215 (CCPA 1980).

6. Claim 45 is rejected under 35 U.S.C. 103(a) as being unpatentable over White et al. in view of Frankosky et al. (U.S. Patent No. 5,527,600).

White et al. do not disclose the fibers to comprise cross sectional shapes recited in claim 45. Frankosky et al. teach that hollow fibers and fibers of variable cross-section are commonly used in insulation materials (column 3, lines 63-67). It would have been obvious to a person having ordinary skill in the art at the time of the invention to use fibers that are hollow or have non-round cross-sectional shapes in order to provide an insulation mat with desired properties, such as lighter weight, improved wicking, or better absorption to the final product for its intended use.

Response to Arguments

7. Applicant's arguments filed February 23, 2004 have been fully considered but they are not persuasive.

8. Applicant argues that the claims are now contrasted with White because the fiber crimp is now induced while the fibers are in the relaxed state. However, this is not sufficient to meet Applicant's burden, set forth above, that the product of White is materially different than the product created by Applicant's process. The Examiner has acknowledged the deficiencies in White with respect to the various process limitations presented in the claims. But the Examiner has provided a rationale tending to show that the claimed product appears to be the same or similar to that of White, although produced by a different process. The fabric of White still meets the structural limitations of the claimed product according to the 102/103 standard set forth above as either being identical with or only slightly different than the claimed product. Even if the fibers of White were not crimped in a relaxed state, the final insulation material would still be high loft, low density nonwoven web having a z-direction orientation made from bicomponent spunbond fibers having a side-by-side orientation with a crimp.

Conclusion

9. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within

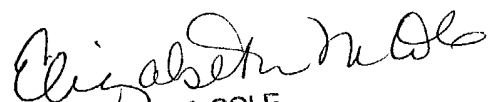
TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jeremy R. Pierce whose telephone number is (571) 272-1479. The examiner can normally be reached on Monday-Thursday 7-4:30 and alternate Fridays 7-4.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Terrel Morris can be reached on (571) 272-1478. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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ELIZABETH M. COLE
PRIMARY EXAMINER